

**ILLINOIS ENVIRONMENTAL PROTECTION AGENCY**

**BUREAU OF AIR**

**DIVISION of AIR POLLUTION CONTROL**

**PERMIT SECTION**

PROJECT SUMMARY for the  
PROPOSED TITLE V - CLEAN AIR ACT PERMIT PROGRAM (CAAPP) PERMIT

Metropolitan Water Reclamation District of Greater Chicago  
Stickney Water Reclamation Plant  
6001 Pershing Road, Stickney, 60804-4112

Permit Engineer/Technical Contact: Michael Haggitt, 217/782-2113

Community Relations/Comments Contact: Brad Frost, 217/782-7027

Springfield, Illinois

## I. INTRODUCTION

This source has applied for a renewal of the Title V - Clean Air Act Permit Program (CAAPP) operating permit (I.D. 031300AAL, Permit #95090075) for its existing operation.

The CAAPP is the program established in Illinois for operating permits for significant stationary sources as required by the federal Clean Air Act, as amended in 1990, and 40 CFR Part 70. Unlike state operating permits, the conditions in a CAAPP permit are enforceable by both the Illinois Environmental Protection Agency (Illinois EPA) and the USEPA. This document is for informational purposes only and does not shield the Permittee from enforcement actions or its responsibility to comply with applicable regulations. This document shall not constitute a defense to a violation of the Act or any rule or regulation.

A Title V permit contains conditions listing the applicable state and federal air pollution control regulations that apply to a source. The permit conditions also establish emission limits, appropriate compliance procedures, and specific operational flexibility. The appropriate compliance procedures may include monitoring, record keeping, and reporting to show compliance with these requirements. The Permittee must carry out these procedures on an on-going basis to demonstrate that the source is operating in accordance with the requirements of the permit.

## II. SOURCE DESCRIPTION INFORMATION

### a. Location and nature of business

The source treats domestic and industrial wastewater from the central part of Chicago and surrounding suburbs.

### b. National Ambient Air Quality Standard status for this area

This source is located in an area that is in non-attainment of the National Ambient Air Quality Standards for Ozone and PM<sub>2.5</sub> and attainment for all other pollutants.

### c. Major source status

The proposed permit is based on:

1. The source requiring a CAAPP permit as a major source of NO<sub>x</sub>, VOM, CO and SO<sub>2</sub> emissions. The source became major for SO<sub>2</sub> and CO in 2003 due to the addition of boilers B1 and B2.
2. The source requiring a CAAPP because the source is considered a single source with Metropolitan Biosolids Management, LLC, I.D. No. 031051APL, located at 6001 West Pershing Road, Stickney. The Permittees have elected to obtain separate CAAPP permits for their operations.

d. Significant emission units

Emission Unit	Description	Date Constructed	Emission Control Equipment
01	Ozone System for Sludge Thickener Area OZG1 & OZG2 & Ozone System for Digester Holding Tanks, OZG3 & OZG4	OZG1 & OZG2 September 1998  OZG3 & OZG4 May 1990	None
02	One 10,000 Gallon Gasoline Storage Tank GT2	November 1996	Stage II Control System
03	Gas Boilers B1 & B2 (58.2 mmBtu/Hr Firing Rate)  Gas Boilers B3, B4, and B5 (94.15 mmBtu/Hr Firing Rate)  Gas Boiler B7 (94.15 mmBtu/Hr Firing Rate)	B1 & B2 March 2003  B3, B4, and B5 February 1985  B7 December 1997	None
04	Waste Gas Burner Units WGB1 (Six Identical Units), WGB2 (Six Identical Units with Maximum Firing Rate of 13.35 mmBtu/Hr)	WGB1 July 1990  WGB2 May 1990	None
05	Digester Holding Tanks (1-12)	1-4 - 1963 5-8 - 1968 9-12 - 1992	None
06	Gas Turbine DC-990 (Maximum Firing Rate 41.66 mmBtu/Hr)	July 1986	None

### III. EMISSIONS INFORMATION

The proposed permit limits the source wide maximum annual emissions from significant emission units at the source. Insignificant activities at this source are not accounted for in the source-wide limit. Further unit specific emission unit limitations are found within Sections 5 and 7 of the proposed permit.

For purposes of fees, the source is allowed the following emissions:

Pollutant	Tons/Year
Volatile Organic Material (VOM)	316.71
Sulfur Dioxide (SO <sub>2</sub> )	158.41
Particulate Matter (PM)	44.61
Nitrogen Oxides (NO <sub>x</sub> )	265.38
Hazardous Air pollutant (HAP). not included in	-----

VOM or PM	
TOTAL	785.11

This proposed permit contains terms and conditions that address the applicability, and, if determined applicable, substantive requirements of Title I of the Clean Air Act (CAA) and regulations promulgated thereunder, including 40 CFR 52.21, Prevention of Significant Deterioration (PSD) and 35 IAC Part 203, Major Stationary Sources Construction and Modification. Any such terms and conditions are identified within the proposed permit by T1, T1R, or T1N. Any conditions established in a construction permit [T1] pursuant to Title I and not revised or deleted in this proposed permit, remain in effect pursuant to Title I provisions until such time that the Illinois EPA revises or deletes them. Where the source has requested that the Illinois EPA establish new [T1N] or revise [T1R] such conditions in a Title I permit, those conditions are consistent with the information provided in the Title V application and will remain in effect pursuant to Title I provisions until such time that the Illinois EPA revises or deletes them.

This proposed permit does establish newly revised [T1R] requirements.

#### IV. EMISSIONS CONTROL PROGRAMS INFORMATION

##### a. Emissions Reduction Market System (ERMS)

Because this source is located in the Chicago ozone non-attainment area and emits volatile organic material (VOM), the proposed permit includes conditions to implement the Emissions Reduction Market System (ERMS). The ERMS is a market-based program designed to reduce VOM emissions from stationary sources to contribute to reasonable further progress toward attainment, as further described in Section 6.0 of the proposed permit. The proposed permit contains the Illinois EPA's determination of the source's baseline emissions and allotment of trading units under the ERMS, and identifies units not subject to further reductions.

#### V. COMPLIANCE ASSURANCE MONITORING (CAM) PLAN INFORMATION

The Compliance Assurance Monitoring (CAM) plan is a program for pollutant-specific emission units which use an add-on control device to achieve compliance with an emission limitation or standard, has potential pre-control device emissions of the applicable regulated air pollutant that are equal to or greater than major source threshold levels, and is not specifically exempt by 40 CFR Part 64. There are no specific emission units that require a CAM plan as identified in the Monitoring Requirements of Subsection 8 for each Section 7, Unit Specific Conditions for Specific Emission Units.

#### VI. OTHER PERTINENT INFORMATION

a. Risk Management Plan (RMP)

A risk management plan (RMP) is a program required for a source affected by Chemical Accident Prevention for reducing the levels of emissions during an emergency, consistent with safe operating procedures. If the Permittee becomes subject to the RMP then the Permittee would be required to immediately implement the appropriate steps described in this plan should an emergency be declared. The Permittee then would be required to maintain and have this plan on file with the Illinois EPA.

b. Episode Action Plan (EAP)

An episode action plan (EAP) is a program for reducing the levels of emissions during yellow alerts, red alerts, and emergencies, consistent with safe operating procedures. The Permittee is required to immediately implement the appropriate steps described in this plan should an air pollution alert or emergency be declared. The Permittee is required to maintain and have this plan on file with the Illinois EPA.

VII. COMPLIANCE INFORMATION

The source has certified compliance with all applicable rules and regulations; therefore, a compliance schedule is not required for this source.

VIII. REQUEST FOR COMMENTS

It is the Illinois EPA's preliminary determination that this source's permit application meets the standards for issuance of a Title V permit. The Illinois EPA is therefore proposing to issue a Title V permit, subject to the conditions proposed in the draft permit.

Comments are requested by the Illinois EPA for the proposed permit. If substantial public interest is shown in this matter, the Illinois EPA will consider holding a public hearing in accordance with 35 Ill. Adm. Code Part 166.